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- *Breakthrough Pharmacotherapy Redefining Obesity Management*
- *E-Cigarette Use Linked to Significant Oral Health Complications*
- *Critical Gaps in VTE Prophylaxis for Pregnant Women*

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Editorial

Transforming Obesity Care: Medications at the Forefront

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INTRODUCTION

The Semaglutide (Ozempic®) and Tirzepatide (Mounjaro®) is an excellent breakthrough in the management of obesity. Though these medications were initially intended to treat type 2 diabetes, they have also shown promise in managing weight. Ozempic is a GLP 1 receptor agonist, while Mounjaro is a GIP and GLP 1 receptor agonist and they primarily act on GLP-1 (and GIP for tirzepatide) pathways to control appetite and slow down digestion process resulting in weight loss. Many clinical trials have been conducted internationally to check their effect on weight management, Some of these trials have shown average reductions (15–22%) of body weight, which is significant as compared to lifestyle modification alone [1, 2]. In the SURMOUNT-1 trial, patients without any history of diabetes lost up to 22.5% of body weight over a period of 72 weeks [1], whereas in SURPASS-2 trial , patients with type 2 diabetes showed HbA1c reductions of up to 2.3% and lost up to 12.4 kg weight lost. These results are better as compared to semaglutide [3]. Obesity is closely linked to diabetes, heart disease, and certain cancers, therefore a more justifiable access and provision of these medicines could help to reduce long-term healthcare burdens.

Obesity increases the risk of diabetes, heart disease, and some cancers. Provision of these weight reducing medicines can help to reduce long term health care cost.

The rising trend of these medications clearly shows how obesity is misunderstood among general population. With the advancement in medicine, it is now regarded as a complex metabolic disease with the significant role of biological, genetic, social and environmental factors as and not just a matter of personal choice. However, these medicines still should not be taken as an only option to manage weight and should be used as an adjunct treatment along with diet counseling, physical activity, and behavioural modifications.

These medications have fewer side effects, mostly related to GIT tract, like nausea, vomiting, and diarrhoea. In multiple trials, 56–78% of participants encountered gastrointestinal adverse events, with 4–9% quitting treatment because of these side effects [1, 3]. Their long-term safety data beyond 2–3 years is still uncertain [1, 4].

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Success stories have spread quickly through social media, drawing a lot of public and mainstream attention. Pharmaceutical companies have also made a lot of money and are likely to make even more as demand rises. A major ethical concern is the rapid rise in off-label and cosmetic use of these medicines by people who do not have obesity or type 2 diabetes. They are usually inspired by trends on social media and the influence of celebrities [5, 6]. This raises a concern about fair access, ethical prescribing, and availability of medicine for those in actual need [7, 8]. The high cost further restricts its use especially in low- and middle-income countries like Pakistan [9, 10].

These medication are ideal for South Asian population who have high insulin resistance and central obesity because of its care free diet and sedentary lifestyle, however, issues like high cost, insurance coverage and unequal health care services for rural areas needs to be addressed to achieve its maximum benefits. In addition, patients education about how these medicines work, and what their possible side effects and efficacy are when combined with diet and lifestyle modifications are also essential to obtain maximum benefit for the patient.

CONCLUSION

The Semaglutide and Tirzepatide are new medicines that help to better manage obesity than from lifestyle changes alone. However, the fact that they prescribe them in the absence of clear indications and at least questionable long-term safety profile makes their approach cautious and responsible.

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Declared none.

CONFLICT OF INTEREST

Declared none.

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